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10/648,445	08/27/2003	Heather N. Bean	10018579-1	4591

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EXAMINER
KHAN, USMAN A

ART UNIT	PAPER NUMBER
2622	

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05/18/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

	Application No.	Applicant(s)
Office Action Summary	10/648,445	BEAN ET AL.
	Examiner	Art Unit	
	Usman Khan	2622	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE <u>3</u> MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
  Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1) ☒ Responsive to communication(s) filed on <u>28 February 2007</u>.

2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.

3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4) ☒ Claim(s) <u>1-28</u> is/are pending in the application.

    4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5) ☐ Claim(s) _____ is/are allowed.

6) ☒ Claim(s) <u>1-28</u> is/are rejected.

7) ☐ Claim(s) _____ is/are objected to.

8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9) ☐ The specification is objected to by the Examiner.

10) ☒ The drawing(s) filed on <u>27 August 2003</u> is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.

    Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

    Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a) ☐ All b) ☐ Some * c) ☐ None of:

      1. ☐ Certified copies of the priority documents have been received.

      2. ☐ Certified copies of the priority documents have been received in Application No. _____.

      3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

    * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)

2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)

3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
    Paper No(s)/Mail Date _____.

4) ☐ Interview Summary (PTO-413)
    Paper No(s)/Mail Date. _____ .

5) ☐ Notice of Informal Patent Application

6) ☐ Other: _____.

DETAILED ACTION

Response to Arguments

Applicant's arguments filed on 02/28/2007 with respect to claims 1 - 28 have

been considered but are moot in view of the new ground(s) of rejection.

Regarding specification: applicant argument has amended the specification to

overcome the objection to the specification. Hence the objection is withdrawn.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that

form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1 – 2, 13, 24, 25, and 27 – 28 are rejected under 35 U.S.C. 102(b) as

being anticipated by Lee et al. (US patent No. 2003/0193593).

Regarding **claim 1,** Lee et al. discloses a method of selectively reading less than

all information available at an output of an image sensor for which member-pixels of a

subset of an entire set of pixels are individually addressable (figures 1 - 3 and

Paragraph 0016), the method comprising: sampling information, at the output of the

image sensor, representing targeted member-pixel of the subset without having to read

information representing the entire set of pixels (figures 1 - 3 and Paragraph 0016 *et seq.*); and selectively reading information, at the output of the image sensor, representing another one or more but fewer than all member pixels of the entire set based upon the sampling information without having to read information representing all pixels on the image sensor (figures 1 - 3 and Paragraph 0016 *et seq.*).

Regarding **claim 2,** Lee et al. discloses the method of claim 1, further comprising: reading information, at the output of the image sensor, representing member-pixels of the entire set that are located within a predetermined area adjacent to or surrounding the targeted member-pixel of the subset (figures 1 - 3 and Paragraph 0016 *et seq.*).

Regarding **claim 13,** Lee et al. discloses a method of selectively reading data available at an output of an image sensor, the method comprising: reading less than all data available at an output of an image sensor for which selected ones but not all of the entire set of pixels are individually addressable (figures 1 - 3 and Paragraph 0016 *et seq.*).

Regarding **claim 24,** Lee et al. discloses a digital camera (it is inherent this kind of CMOS imagers are used in cameras and it is inherent that the method for correcting pixels can be implemented in the camera for reduction of size and ease of use) comprising: a pixel-differentiated image sensor for which member-pixels of a subset of

the entire set of pixels are individually addressable (figures 1 - 3 and Paragraph 0016 *et seq.*), the image sensor being controllable to read less than all of the pixels without having to read all of the pixels (figures 1 - 3 and Paragraph 0016 *et seq.*); and a processor operable to obtain sampling information from a targeted member-pixel of the subset without having to read information from the entire set of pixels (figures 1 - 3 and Paragraph 0016 *et seq.*); and selectively obtain information from another one or more but fewer than all member pixels of the entire set based upon the sampling information without having to read all of the pixels on the image sensor (figures 1 - 3 and Paragraph 0016 *et seq.*).

Regarding **claim 25,** Lee et al. discloses the digital camera of claim 24, wherein the processor is operable to selectively obtain information from member-pixels of the entire set that are located within a predetermined area adjacent to or surrounding the targeted member-pixel of the subset (figures 1 - 3 and Paragraph 0016 *et seq.*).

Regarding **claim 27,** Lee et al. discloses a digital camera (it is inherent this kind of CMOS imagers are used in cameras and it is inherent that the method for correcting pixels can be implemented in the camera for reduction of size and ease of use) comprising: a pixel-differentiated image sensor for which selected ones of the entire set of pixels are individually addressable (figures 1 - 3 and Paragraph 0016 *et seq.*), the image sensor being organized into a matrix of partitions (figures 1 - 3 and Paragraph 0016 *et seq.*), each partition including a member-pixel of the subset referred to as a

sampling pixel (figures 1 - 3 and Paragraph 0016 *et seq.*); and a processor operable to obtain sampling data from a sampling pixel without having to obtain information from the other pixels in the corresponding partition (figures 1 - 3 and Paragraph 0016 *et seq.*), and selectively obtain data from at least the entire corresponding partition but fewer than all of the partitions depending upon the sampled-data without having to obtain information from all of the pixels on the image sensor (figures 1 - 3 and Paragraph 0016 *et seq.*).

Regarding **claim 28,** Lee et al. discloses the digital camera of claim 27, wherein the processor is operable to selectively obtain data from partitions located within a predetermined area adjacent to or surrounding the sampling pixel (figures 1 - 3 and Paragraph 0016 *et seq.*).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 3 – 9, 14 – 20, and 26 are rejected under 35 U.S.C. 103(a) as being unpatentable over Lee et al. (US patent No. 2003/0193593) in view of Kinjo et al. (US patent No. 6,631,208).

Regarding **claims 3**, as mentioned above in the discussion of claim 2, Lee et al.

teaches all of the limitations of the parent claims. However, Lee et al. fails to disclose

organizing the entire set of pixels into partitions, each partition having multiple pixels;

mapping one or more of the partitions one or more of the member-pixels of the subset,

respectively; reading information, at the output of the image sensor, representing all

member-pixels of the subset so as to generate a plurality of samples; handling the

samples in a manner that preserves a relationship between each sample and

corresponding member-pixel of the subset; and reading information, at the output of the

image sensor, representing one or more of the partitions mapped to the member-pixels

of the subset but not all of the partitions based upon the plurality of samples. Kinjo et al.,

on the other hand teaches organizing the entire set of pixels into partitions, each

partition having multiple pixels; mapping one or more of the partitions one or more of the

member-pixels of the subset, respectively; reading information, at the output of the

image sensor, representing all member-pixels of the subset so as to generate a plurality

of samples; handling the samples in a manner that preserves a relationship between

each sample and corresponding member-pixel of the subset; and reading information,

at the output of the image sensor, representing one or more of the partitions mapped to

the member-pixels of the subset but not all of the partitions based upon the plurality of

samples.

More specifically, Kinjo et al. teaches organizing the entire set of pixels into

partitions, each partition having multiple pixels (column 3, lines 32 *et seq. and* figures

15A – 15F and 20A – 20B, column 18 lines 20 – 26); mapping one or more of the

partitions one or more of the member-pixels of the subset, respectively (column 3, lines 32 *et seq. and* figures 15A – 15F and 20A – 20B, column 18 lines 20 – 26); reading information, at the output of the image sensor, representing all member-pixels of the subset so as to generate a plurality of samples (column 3, lines 32 *et seq. and* figures 15A – 15F and 20A – 20B, column 18 lines 20 – 26); handling the samples in a manner that preserves a relationship between each sample and corresponding member-pixel of the subset (column 3, lines 32 *et seq. and* figures 15A – 15F and 20A – 20B, column 18 lines 20 – 26); and reading information, at the output of the image sensor, representing one or more of the partitions mapped to the member-pixels of the subset but not all of the partitions based upon the plurality of samples (column 3, lines 32 *et seq. and* figures 15A – 15F and 20A – 20B, column 18 lines 20 – 26).

One of ordinary skill in the art at the time the invention was made would have found it obvious to incorporate the teachings of Kinjo et al. with the teachings of Lee et al. because in column 3, lines 31 - 50 Kinjo et al. teaches that the use of the invention provides a processing method which is capable of producing a finished print with a natural feel from a corrected image.

Regarding **claims 4**, as mentioned above in the discussion of claim 1, Lee et al. teaches all of the limitations of the parent claims. However, Lee et al. fails to disclose determining if the sampling information exceeds a reference value; and reading information, at the output of the image sensor, representing the one or more but fewer than all member-pixels of the entire set if the sampling information exceeds the

reference value. Kinjo et al., on the other hand teaches determining if the sampling information exceeds a reference value; and reading information, at the output of the image sensor, representing the one or more but fewer than all member-pixels of the entire set if the sampling information exceeds the reference value.

More specifically, Kinjo et al. teaches determining if the sampling information exceeds a reference value; and reading information, at the output of the image sensor, representing the one or more but fewer than all member-pixels of the entire set if the sampling information exceeds the reference value (column 3, line 32 - column 4 line 14 and figures 15A – 15F and 20A – 20B, column 18 lines 20 – 26).

One of ordinary skill in the art at the time the invention was made would have found it obvious to incorporate the teachings of Kinjo et al. with the teachings of Lee et al. because in column 3, lines 31 - 50 Kinjo et al. teaches that the use of the invention provides a processing method which is capable of producing a finished print with a natural feel from a corrected image.

Regarding **claims 5**, as mentioned above in the discussion of claim 4, Lee et al. in view of Kinjo et al. teaches all of the limitations of the parent claims. Additionally, Kinjo et al. teaches wherein the reference value represents one of a user-determined threshold or a saturation threshold for the targeted member-pixel of the subset (column 17, line 37 – column 18, line 19).

Regarding **claims 6**, as mentioned above in the discussion of claim 4, Lee et al. in view of Kinjo et al. teaches all of the limitations of the parent claims. Additionally, Kinjo et al. teaches reading information, at the output of the image sensor, representing all member-pixels of the subset so as to generate a plurality of samples (column 3 lines 51 *et seq.*), each member-pixel of the subset having a corresponding reference value, respectively (column 3 lines 51 *et seq.*); applying the determining step to each of the samples (column 3 lines 51 *et seq.*); and reading information, at the output of the image sensor, representing the one or more but fewer than all member-pixels of the entire set located within a predetermined area adjacent to or surrounding member-pixels for which the corresponding sample exceeds the respective reference value (column 17, line 37 – column 18, line 19).

Regarding **claims 7**, as mentioned above in the discussion of claim 4, Lee et al. in view of Kinjo et al. teaches all of the limitations of the parent claims. Additionally, Kinjo et al. teaches the sampling information is the current sampling information (column 3 lines 51 *et seq.*) and the reference value is a first reference value (column 17, line 37 – column 18, line 19); and the method further comprises: taking the difference between the current sampling information and the first reference value (column 3 lines 51 *et seq.*); and reading, at the output of the image sensor, representing the one or more but fewer than all member-pixels of the entire set if the difference exceeds a second reference value (column 17, line 37 – column 18, line 19).

Regarding **claims 8**, as mentioned above in the discussion of claim 7, Lee et al. in view of Kinjo et al. teaches all of the limitations of the parent claims. Additionally, Kinjo et al. teaches wherein the first reference value is the previous sampling information, respectively (column 17, line 37 – column 18, line 19).

Regarding **claims 9**, as mentioned above in the discussion of claim 7, Lee et al. in view of Kinjo et al. teaches all of the limitations of the parent claims. Additionally, Kinjo et al. teaches setting the first reference value to be equal to the current sampling information if the difference exceeds the second reference value (column 17, lines 37 *et seq.*).

Regarding **claim 14,** as mentioned above in the discussion of claim 13, Lee et al. teaches all of the limitations of the parent claims. However, Lee et al. fails to disclose organizing the image sensor into a matrix of partitions, each partition including a member-pixel of the subset referred to as a sampling pixel; selectively reading data from at least the entire corresponding partition but fewer than all of the partitions depending upon the sampled-data without having to read all of the pixels on the image sensor. Kinjo et al., on the other hand teaches organizing the image sensor into a matrix of partitions, each partition including a member-pixel of the subset referred to as a sampling pixel; sampling data at the output of the image sensor, representing a sampling pixel without having to read information representing the other pixels in the corresponding partition; and selectively reading data at the output of the image sensor,

representing at least the entire corresponding partition but fewer than all of the partitions

depending upon the sampled-data without having to read all of the pixels on the image

sensor.

More specifically, Kinjo et al. teaches organizing the image sensor into a matrix

of partitions (column 3, lines 32 *et seq.* figures 15A – 15F and 20A – 20B, column 18

lines 20 – 26), each partition including a member-pixel of the subset referred to as a

sampling pixel (it is inherent that each of these partitions will include a sampling pixel);

sampling data at the output of the image sensor, representing a sampling pixel without

having to read information representing the other pixels in the corresponding partition

(column 13, lines 18 *et seq.*); selectively reading data at the output of the image sensor,

representing at least the entire corresponding partition but fewer than all of the partitions

depending upon the sampled-data without having to read all of the pixels on the image

sensor (column 4, lines 2 *et seq.*).

One of ordinary skill in the art at the time the invention was made would have

found it obvious to incorporate the teachings of Kinjo et al. with the teachings of Lee et

al. because in column 3, lines 31 - 50 Kinjo et al. teaches that the use of the invention

provides a processing method which is capable of producing a finished print with a

natural feel from a corrected image.

Regarding **claims 15**, as mentioned above in the discussion of claim 14, Lee et

al. in view of Kinjo et al. teaches all of the limitations of the parent claims. Additionally,

Kinjo et al. teaches reading data at the output of the image sensor, representing

partitions located within a predetermined area adjacent to or surrounding the sampling

pixel (column 3, lines 32 *et seq.*).

Regarding **claims 16**, as mentioned above in the discussion of claim 14, Lee et

al. in view of Kinjo et al. teaches all of the limitations of the parent claims. Additionally,

Kinjo et al. teaches determining if the sampled-data exceeds a reference value; and

reading data at the output of the image sensor, representing the one or more but fewer

than all member-pixels of the entire set if the sampled-data exceeds the reference value

(column 3, line 32 - column 4 line 14 and figures 15A – 15F and 20A – 20B, column 18

lines 20 – 26).

Regarding **claims 17**, as mentioned above in the discussion of claim 16, Lee et

al. in view of Kinjo et al. teaches all of the limitations of the parent claims. Additionally,

Kinjo et al. teaches wherein the reference value represents a saturation threshold for

the targeted member-pixel of the subset (column 17, line 37 – column 18, line 19).

Regarding **claims 18**, as mentioned above in the discussion of claim 16, Lee et

al. in view of Kinjo et al. teaches all of the limitations of the parent claims. Additionally,

Kinjo et al. teaches wherein: the sampled data is the currently sampled data (column 3

lines 51 *et seq.*) and the reference value is a first reference value (column 17, line 37 –

column 18, line 19); and the method further comprises taking the difference between the

currently sampled data and the first reference value (column 3 lines 51 *et seq.*), and

reading from the one or more but fewer than all member-pixels of the entire set if the

difference exceeds a second reference value (column 17, line 37 – column 18, line 19).

Regarding **claims 19**, as mentioned above in the discussion of claim 18, Lee et

al. in view of Kinjo et al. teaches all of the limitations of the parent claims. Additionally,

Kinjo et al. teaches wherein the first reference value is the previously sampled data,

respectively (column 17, line 37 – column 18, line 19).

Regarding **claims 20**, as mentioned above in the discussion of claim 18, Lee et

al. in view of Kinjo et al. teaches all of the limitations of the parent claims. Additionally,

Kinjo et al. teaches setting the first reference value to be equal to the currently sampled

data if the difference exceeds the second reference value (column 17, lines 37 *et seq.*).

Regarding **claim 26,** as mentioned above in the discussion of claim 25, Lee et al.

teaches all of the limitations of the parent claims. However, Lee et al. fails to disclose

wherein the entire set of pixels is further organized into partitions, each partition having

multiple pixels; one or more of the partitions being mapped one or more of the member-

pixels of the subset, respectively; the processor is operable to read information from all

member-pixels of the subset so as to generate a plurality of samples; the processor

further being operable to handle the samples in a manner that preserves a relationship

between each sample and corresponding member-pixel of the subset, and read

information from one or more of the partitions mapped to the member-pixels of the

subset but not all of the partitions based upon the plurality of samples. Kinjo et al., on the other hand teaches wherein the entire set of pixels is further organized into partitions, each partition having multiple pixels; one or more of the partitions being mapped one or more of the member-pixels of the subset, respectively; the processor is operable to read information from all member-pixels of the subset so as to generate a plurality of samples; the processor further being operable to handle the samples in a manner that preserves a relationship between each sample and corresponding member-pixel of the subset, and read information from one or more of the partitions mapped to the member-pixels of the subset but not all of the partitions based upon the plurality of samples.

More specifically, Kinjo et al. teaches wherein the entire set of pixels is further organized into partitions, each partition having multiple pixels (column 3, lines 32 *et seq.* *and* figures 15A – 15F and 20A – 20B, column 18 lines 20 – 26); one or more of the partitions being mapped one or more of the member-pixels of the subset, respectively (column 3, lines 32 *et seq.* *and* figures 15A – 15F and 20A – 20B, column 18 lines 20 – 26); the processor is operable to read information from all member-pixels of the subset so as to generate a plurality of samples (column 3, lines 32 *et seq.* *and* figures 15A – 15F and 20A – 20B, column 18 lines 20 – 26; also it is inherent that this process is controlled by a processor); the processor further being operable to handle the samples in a manner that preserves a relationship between each sample and corresponding member-pixel of the subset (column 3, lines 32 *et seq.* *and* figures 15A – 15F and 20A – 20B, column 18 lines 20 – 26), and read information from one or more of the partitions

mapped to the member-pixels of the subset but not all of the partitions based upon the

plurality of samples (column 3, lines 32 *et seq. and* figures 15A – 15F and 20A – 20B,

column 18 lines 20 – 26).

One of ordinary skill in the art at the time the invention was made would have

found it obvious to incorporate the teachings of Kinjo et al. with the teachings of Lee et

al. because in column 3, lines 31 - 50 Kinjo et al. teaches that the use of the invention

provides a processing method which is capable of producing a finished print with a

natural feel from a corrected image.

Claims 10 -11 are rejected under 35 U.S.C. 103(a) as being unpatentable over

Lee et al. (US patent No. 2003/0193593) in further view of Horie et al. (US patent No.

6,480,624).

Regarding **claim 10**, as mentioned above in the discussion of claim 1, Lee et al.

teaches all of the limitations of the parent claims. However, Lee et al. fails to disclose

that the method further comprises: measuring an elapsed time; reading information at

the output of the image sensor representing all member-pixels of the subset if the

elapsed time exceeds a predetermined amount. Horie et al., on the other hand teaches

that method comprises: measuring an elapsed time; reading information at the output of

the image sensor representing all member-pixels of the subset if the elapsed time

exceeds a predetermined amount.

More specifically, Horie et al. teaches that method comprises: measuring an

elapsed time (column 8, lines 58 *et seq.*); reading information at the output of the image

sensor representing all member-pixels of the subset if the elapsed time exceeds a predetermined amount (column 8, lines 58 *et seq.*).

One of ordinary skill in the art at the time the invention was made would have found it obvious to incorporate the teachings of Horie et al. with the teachings of Lee et al. because in column 8, lines 58 *et seq.* Horie et al. teaches that the use of the time controlled image pickup will result exposure control, this will in turn result in a improved image.

Regarding **claim 11**, as mentioned above in the discussion of claim 10, Lee et al. in further view of Horie et al. teach all of the limitations of the parent claims. Additionally, Horie et al. teaches multiple instances of the elapsed time at the output of the image sensor representing all member-pixel of the subset can be measured in the next cycle of the image capture (column 8, lines 58 *et seq.*).

Claims 21 - 22 are rejected under 35 U.S.C. 103(a) as being unpatentable over Lee et al. (US patent No. 2003/0193593) in view of Kinjo et al. (US patent No. 6,631,208) in further view of Horie et al. (US patent No. 6,480,624).

Regarding **claim 21**, as mentioned above in the discussion of claim 14, Lee et al. in view of Kinjo et al. teaches all of the limitations of the parent claims. However, Lee et al. in view of Kinjo et al. fails to disclose that the method further comprises: measuring an elapsed time; reading information at the output of the image sensor representing all member-pixels of the subset if the elapsed time exceeds a predetermined amount.

Horie et al., on the other hand teaches that method comprises: measuring an elapsed time; reading information at the output of the image sensor representing all member-pixels of the subset if the elapsed time exceeds a predetermined amount.

More specifically, Horie et al. teaches that method comprises: measuring an elapsed time (column 8, lines 58 *et seq.*); reading information at the output of the image sensor representing all member-pixels of the subset if the elapsed time exceeds a predetermined amount (column 8, lines 58 *et seq.*).

One of ordinary skill in the art at the time the invention was made would have found it obvious to incorporate the teachings of Horie et al. with the teachings of Lee et al. in view of Kinjo et al. because in column 8, lines 58 *et seq.* Horie et al. teaches that the use of the time controlled image pickup will result exposure control, this will in turn result in a improved image.

Regarding **claim 22**, as mentioned above in the discussion of claim 21, Lee et al. in view of Kinjo et al. in further view of Horie et al. teach all of the limitations of the parent claims. Additionally, Horie et al. teaches multiple instances of the elapsed time at the output of the image sensor representing all member-pixel of the subset can be measured in the next cycle of the image capture (column 8, lines 58 *et seq.*).

Claim 12 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kinjo et al. (US patent No. 6,631,208) in further view of Examiners Official Notice.

Regarding **claim 12,** Kinjo et al. discloses the method of claim 1, wherein the image sensor is one of a CCD image sensor for which the subset is smaller than the entire set (column 3, lines 32 *et seq.* figures 15A – 15F and 20A – 20B, column 18 lines 20 – 26). However, Kinjo et al. fails to disclose that a CMOS image sensor for which the subset is the same as the entire set (the examiner takes official notice that it is old and well known in the art to get high resolution output from a CMOS imager sensor the subset is the same size as the entire set i.e. the whole CMOS image sensor is read out).

Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to get high-resolution output from a CMOS imager sensor the entire CMOS image sensor is read.

Claims 23 is rejected under 35 U.S.C. 103(a) as being unpatentable over Kinjo et al. (US patent No. 6,631,208) in view of Kinjo et al. (US patent No. 6,631,208) in further view of Examiners Official Notice.

Regarding **claim 23,** Kinjo et al. in view of Kinjo et al. discloses the method of claim 14, wherein the image sensor is one of a CCD image sensor for which the subset is smaller than the entire set (column 3, lines 32 *et seq.* figures 15A – 15F and 20A – 20B, column 18 lines 20 – 26). However, Kinjo et al. in view of Kinjo et al. fails to disclose that a CMOS image sensor for which the subset is the same as the entire set (the examiner takes official notice that it is old and well known in the art to get high

resolution output from a CMOS imager sensor the subset is the same size as the entire

set i.e. the whole CMOS image sensor is read out).

Therefore, it would have been obvious to one of ordinary skill in the art at the

time the invention was made to get high-resolution output from a CMOS imager sensor

the entire CMOS image sensor is read.

Conclusion

Applicant's amendment necessitated the new ground(s) of rejection presented in

this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a).

Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE

MONTHS from the mailing date of this action. In the event a first reply is filed within

TWO MONTHS of the mailing date of this final action and the advisory action is not

mailed until after the end of the THREE-MONTH shortened statutory period, then the

shortened statutory period will expire on the date the advisory action is mailed, and any

extension fee pursuant to 37 CFR1.136(a) will be calculated from the mailing date of the

advisory action. In no event, however, will the statutory period for reply expire later than

SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the

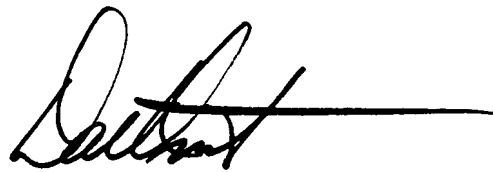examiner should be directed to Usman Khan whose telephone number is (571) 270-

1131. The examiner can normally be reached on Mon-Thru 6:45-4:15; Fri 6:45-3:15 or

Alt. Fri off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's

supervisor, David Ometz can be reached on (571) 272-7593. The fax phone number for

the organization where this application or proceeding is assigned is 571-273-8300.

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